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24280 7590 08/03/2007 CHOATE, HALL & STEWART LLP TWO INTERNATIONAL PLACE BOSTON, MA 02110			EXAMINER LIN, KENNY S	
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

Application No.

09/970,767

Applicant(s)

JAMAIL ET AL.

Examiner

Kenny Lin

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 20 June 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-2, 4--8, 11-29 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-2, 4--8, 11-29 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- ☒ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_\_
- ☐ Notice of Informal Patent Application
- ☐ Other: \_\_\_\_\_

### DETAILED ACTION

1. Claims 1-2, 4-8 and 11-29 are presented for examination. Claims 3, 9-10 and 30-32 are canceled.

#### *Claim Rejections - 35 USC § 103*

2. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

3. Claims 1-2, 11-12 and 22-24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Major, US 6,542,967, in view of Bommaiah et al (Bommaiah), US 6,708,213 and Burns et al (Burns), US 6,324,182.

4. Major, Bommaiah and Burns were cited in the previous office action.

5. As per claims 1 and 22, Major taught the invention substantially as claimed including a method/system to cache and redistribute streaming digital data content to a plurality of requesting client machines, said method comprising:

- a. Receiving a first content request, for a streaming content, from a requesting client machine, wherein said requesting client machine does not send information

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identifying a secondary server containing said streaming content corresponding to said first content request (col.5, lines 10-27);

- b. Generating a second content request based on the first content request (col.5, lines 20-21);
- c. Transmitting the second content request to at least one secondary server known to contain said streaming content (col.5, lines 20-27);
- d. Receiving said streaming content from said at least one secondary server in response to said second content request (col.5, lines 20-24);
- e. Caching locally at least a first portion of the received streaming content;
- f. Forwarding, to the requesting client machine, the received streaming content as a content corresponding to the first content request as said streaming content is being dynamically cached; and transmitting the streaming content in response to a subsequent content request from a same or a different requesting client machine from the local cache (col.5, lines 20-24).

6. Major did not specifically teach to re-streaming the first portion of the cached streaming content to the request client machine as at least a second portion of the received streaming content is cached; and re-streaming, at a later time from the local cache, at least one of the first portion and the second portion of the streaming content to a same or different requesting client machine in response to a subsequent content request. Bommaiah taught to re-stream the first portion of the cached stream content to the request client machine as at least a second portion of the received streaming content is cached (claim 16). It would have been obvious to one of

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ordinary skill in the art at the time the invention was made to combine the teachings of Major and Bommaiah because Bommaiah's teaching of caching and transferring portion of the stream content while receiving the remaining portion enables Major's method to reduce latency and server loads in streaming multimedia contents (see Bommaiah, col.3, lines 1-10). Major and Bommaiah did not specifically teach to re-streaming, at a later time from the local cache, at least one of the first portion and the second portion of the streaming content to a same or different requesting client machine in response to a subsequent content request. Burns taught to stream the streaming content to the client machine and to stream the streaming content at a later time from the local cache to a requesting client machine in response to a subsequent content request (col.3, lines 15-26, 65-67, col.4, lines 1-15, 39-41, col.5, lines 7-27). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns because Burns' teaching of on-demand caching and pre-caching the contents enables requesting users of Major and Bommaiah's method to receive content using real-time intelligent streaming (see Burns, col.4, lines 36-47).

7. As per claim 11, Major taught the invention substantially as claimed including a system usable to cache and redistribute streaming digital data content to a plurality of requesting client machines, said system comprising a proxy server able to receive a first content request for a streaming content from a requesting client machine, wherein said requesting client machine does not send information identifying a secondary server containing said streaming content corresponding to said first content request (col.5, lines 10-27), and said proxy server able to generate and transmit a second content request to at least one secondary server known to contain

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said streaming content (col.5, lines 20-21), and said proxy server able to receive the streaming content from said at least one secondary server in response to said second content request (col.5, lines 20-24) and caching the received streaming content locally (col.5, lines 20-24) and forwarding, to the requesting client machine, the received streaming content as a content corresponding to the first content request as said streaming content is cached; and transmitting the streaming content in response to a subsequent content request from a same or a different requesting client machine from the local cache (col.5, lines 20-24).

8. Major did not specifically teach to re-streaming the first portion of the cached streaming content to the request client machine as at least a second portion of the received streaming content is cached; and re-streaming, at a later time from the local cache, at least one of the first portion and the second portion of the streaming content to a same or different requesting client machine in response to a subsequent content request. Bommaiah taught to re-stream the first portion of the cached stream content to the request client machine as at least a second portion of the received streaming content is cached (claim 16). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major and Bommaiah because Bommaiah's teaching of caching and transferring portion of the stream content while receiving the remaining portion enables Major's method to reduce latency and server loads in streaming multimedia contents (see Bommaiah, col.3, lines 1-10). Major and Bommaiah did not specifically teach to re-streaming, at a later time from the local cache, at least one of the first portion and the second portion of the streaming content to a same or different requesting client machine in response to a subsequent content request. Burns taught to stream

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the streaming content to the client machine and to stream the streaming content at a later time from the local cache to a requesting client machine in response to a subsequent content request (col.3, lines 15-26, 65-67, col.4, lines 1-15, 39-41, col.5, lines 7-27). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns because Burns' teaching of on-demand caching and pre-caching the contents enables requesting users of Major and Bommaiah's method to receive content using real-time intelligent streaming (see Burns, col.4, lines 36-47).

9. As per claim 2, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 1. Major further taught to determine, before generating the second content request, if at least part of the streaming content corresponding to the first content request is locally cached; and re-streaming the locally cached streaming content as at least a part of the content corresponding to the first content request and performing the generating, transmitting, receiving and caching steps for any un-cached part of said streaming content corresponding to said first content request as part of updating said locally cached streaming content (col.5, lines 10-27). Burns further taught to stream the real-time streaming content such as video or audio to the client machine (col.3, lines 15-26, 65-67, col.4, lines 1-15, 39-41, col.5, lines 7-27).

10. As per claims 12 and 23, Major, Bommaiah and Burns taught the invention substantially as claimed in claims 11 and 22. Major further taught to comprise a storage device usable to cache said streaming content locally relative to the proxy server (col.5, lines 10-27).

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11. As per claim 24, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 23. Major further taught to comprise means for determining whether content corresponding to the first content request is stored in the storing means, such that, when content corresponding to the first content request is stored in the storing means, the means for transmitting the received content transmits the content stored in the storage means corresponding to the first content request to the requesting client machine as the content corresponding to the first content request (col.5, lines 10-27).

12. Claims 4-5, 13-15 and 25-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Major, Bommaiah and Burns as applied to claims 1-2, 11-12, 22-24 above, and further in view of Doyle, US 6,678,793.

13. Doyle was cited in the previous office action.

14. As per claim 4, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 2. Major, Bommaiah and Burns did not specifically teach to determine, if the streaming content corresponding to the first content request is locally cached, whether to update the locally cached streaming content corresponding to the first content request; re-stream the locally cached streaming content as the content corresponding to the first content request in place of performing the generating, transmitting, receiving and caching steps if the locally cached streaming content is not to be updated; and perform the generating, transmitting, receiving and caching steps if the locally cached streaming content is to be updated. Doyle taught to comprise:



- a. Determining, if the streaming content corresponding to the first content request is locally cached, whether to update the locally cached streaming content corresponding to the first content request (col.7, lines 17-22, 32-37);
- b. Re-streaming the locally cached streaming content as the content corresponding to the first content request in place of performing the generating, transmitting, receiving and caching steps if the locally cached streaming content is not to be updated (col.7, lines 38-40); and
- c. Performing the generating, transmitting, receiving and caching steps if the locally cached streaming content is to be updated (col.7, lines 48-55, col.8, lines 15-26).

15. It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Doyle because Doyle's teaching determining whether the cached content is valid or not enables Major, Bommaiah and Burns's method to retrieving the updated contents from a remote server (See Doyle, col.7, lines 32-40, 48-55, col.8, lines 15-26).

16. As per claim 5, Major, Bommaiah and Burns and Doyle taught the invention substantially as claimed in claim 4. Doyle further taught to determine whether to update the locally cached streaming content corresponding to the first content request comprises at least one of determining if the locally cached streaming content corresponding to the first content request is older than an update age (col.1, lines 43-46, col.7, lines 32-34); determining if the locally cached

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streaming content corresponding to the first content request includes expiration information (col.1, lines 43-46, col.7, lines 32-34).

17. As per claim 13, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 12. Major, Bommaiah and Burns did not specifically teach the proxy server to determine whether said streaming content corresponding to the first content request is cached, partially or fully, in the storage device, such that, if any part of said streaming content corresponding to the first content request is cached in the storage device, the proxy server re-streams the part of the streaming content cached in the storage device corresponding to the first content request to the requesting client machine as at least a part of the streaming content corresponding to the first content request. Doyle taught the proxy server to determine whether said streaming content corresponding to the first content request is cached, partially or fully, in the storage device (col.7, lines 17-22), such that, if any part of said streaming content corresponding to the first content request is cached in the storage device, the proxy server re-streams the part of the streaming content cached in the storage device corresponding to the first content request to the requesting client machine as at least a part of the streaming content corresponding to the first content request (col.7, lines 38-40). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Doyle because Doyle's teaching determining whether the cached content is valid or not enables Major, Bommaiah and Burns's method to retrieving the updated contents from a remote server (See Doyle, col.7, lines 32-40, 48-55, col.8, lines 15-26).

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18. As per claim 14, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 12. Major, Bommaiah and Burns did not specifically teach the proxy server to determine, for a particular steaming content cached in the storage device, whether to update that particular streaming content cached in the storage device in response to receiving a content request to which that particular streaming content corresponds. Doyle taught the proxy server to determine, for a particular steaming content cached in the storage device, whether to update that particular streaming content cached in the storage device in response to receiving a content request to which that particular streaming content corresponds (col.1, lines 43-46, col.7, lines 32-34). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Doyle because Doyle's teaching determining whether the cached content is valid or not enables Major, Bommaiah and Burns's method to retrieving the updated contents from a remote server (See Doyle, col.7, lines 32-40, 48-55, col.8, lines 15-26).

19. As per claim 15, Major, Bommaiah and Burns and Doyle taught the invention substantially as claimed in claim 14. Doyle further taught that when the proxy server determine to update the streaming content, the proxy server transmits a second content request to which that particular streaming content corresponds to at least one secondary server (col.7, lines 48-55, col.8, lines 15-26).

20. As per claim 25, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 23. Major, Bommaiah and Burns did not specifically teach to comprise

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updating means for determining, for a particular content stored in the storing means, whether to update that particular content stored in the storing means in response to receiving a content request to which that particular content corresponds. Doyle taught to comprise updating means for determining, for a particular content stored in the storing means, whether to update that particular content stored in the storing means in response to receiving a content request to which that particular content corresponds (col.1, lines 43-46, col.7, lines 32-34). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Doyle because Doyle's teaching determining whether the cached content is valid or not enables Major, Bommaiah and Burns's method to retrieving the updated contents from a remote server (See Doyle, col.7, lines 32-40, 48-55, col.8, lines 15-26).

21. As per claim 26, Major, Bommaiah and Burns and Doyle taught the invention substantially as claimed in claim 25. Doyle further taught that when the updating means determines to update the content, the means for generating and transmitting transmits a second content request to which that particular content corresponds to at least one secondary server (col.7, lines 48-55, col.8, lines 15-26).

22. Claims 8, 16-21 and 27-29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Major, Bommaiah and Burns as applied to claims 1-2, 11-12 and 22-23 above, and further in view of Shannon, US 6,233,618.

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23. Shannon was cited in the previous office action.

24. As per claim 8, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 1. Major, Bommaiah and Burns did not specifically teach the method to comprise

- a. Determining whether at least one secondary server is known to store at least a type of content that corresponds to the streaming content corresponding to the first content request based on a stored content map;
- b. Searching, if at least one secondary server is not known, a plurality of secondary servers to identify at least one secondary server that contains at least a type of content that corresponds to the streaming content corresponding to the first content request;
- c. Adding, in response to the searching step, to the stored content map the at least one identified secondary server located by the search; and
- d. Transmitting, based on the at least one secondary server identified in the content map, the second content request to that at least one secondary server in response to either the adding step or the at least one secondary server determining step.

25. Shannon taught a method to restrict user access using categories to determine whether at least one secondary server is known to store at least a type of content that corresponds to the streaming content corresponding to the first content request based on a stored content map (col.9, lines 18-24, 64-67, col.10, lines 1-28); searching a plurality of secondary servers to identify at

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least one secondary server that contains at least a type of content that corresponds to the streaming content corresponding to the first content request if at least one secondary server is not known (col.10, lines 10-28); in response to the searching step, adding to the stored content map the at least one identified secondary server located by the search (col.10, lines 21-28) and transmitting, based on the at least one secondary server identified in the content map, the second content request to that at least one secondary server in response to either the adding step or the at least one secondary server determining step (col.10, lines 24-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah and Burns method to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.

26. As per claim 16, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 12. Major, Bommaiah and Burns did not specifically teach to comprise a content map that indicates, for at least some content requests, at least one secondary server known to store at least a type of content that corresponds to that content request and wherein said content map indicates, at least for some content requests, if a streaming content corresponding to a content request needs to be updated because only a part of said streaming content is presently cached in said storage device. Shannon taught to comprise a content map that indicates, for at least some content requests, at least one secondary server known to store at least a type of

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content that corresponds to that content request (col.9, lines 18-24, 64-67, col.10, lines 1-28; category database), and wherein said content map indicates, at least for some content requests, if a streaming content corresponding to a content request needs to be updated because only a part of said streaming content is presently cached in said storage device (col.10, lines 10-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah and Burns's method to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.

27. As per claim 17, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claim 16. Shannon further taught that the proxy server determines the at least one secondary server to which the second content request is transmitted based on the content map (col.9, lines 18-24, 64-67, col.10, lines 1-28).

28. As per claim 18, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claim 16. Shannon taught a proxy server to determine whether the content map indicates at least one secondary server known to store at least a type of content that corresponds to the streaming content corresponding to the first content request, the proxy server generating a search of a plurality of secondary servers if the content map does not indicates at least one secondary server known to store at least a type of content that corresponds to the

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streaming content corresponding to the first content request, and the proxy server updating the content map based on results of the search (col.10, lines 10-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah and Burns's method to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.

29. As per claim 19, Major, Bommaiah and Burns taught the invention substantially as claimed in claims 11. Major, Bommaiah and Burns did not specifically teach to comprise a content map that indicates at least one secondary server known to store at least a type of content that corresponds to a content request. Shannon taught to comprise a content map that indicates at least one secondary server known to store at least a type of content that corresponds to a content request (col.9, lines 18-24, 64-67, col.10, lines 1-28). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah and Burns's method to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.



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30. As per claims 20, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claim 19. Shannon further taught that the proxy server determines the at least one secondary server to which the second content request is transmitted based on the content map (col.9, lines 18-24, 64-67, col.10, lines 1-28).

31. As per claim 21, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claims 19. Shannon further taught a proxy server to determine whether the content map indicates at least one secondary server known to store at least a type of content that corresponds to the streaming content corresponding to the first content request, the proxy server generating a search of a plurality of secondary servers if the content map does not indicate at least one secondary server known to store at least a type of content that corresponds to the streaming content corresponding to the first content request, the proxy server updating the content map based on results of the search (col.10, lines 10-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59).

32. As per claims 27, Major, Bommaiah and Burns taught the invention substantially as claimed in claim 22. Major, Bommaiah and Burns did not specifically teach to further comprise a content map that indicates, for at least some content requests, at least one secondary server known to store at least a type of content that corresponds to that content request. Shannon taught to comprise a content map that indicates at least one secondary server known to store at least a type of content that corresponds to a content request (col.9, lines 18-24, 64-67, col.10, lines 1-28; category database) and further use the content map to match the content request and determine

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whether the requesting user is permitted to access the secondary server (col.10, lines 24-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah and Burns and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah and Burns's system to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.

33. As per claim 28, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claim 27. Shannon further taught that the means for generating and transmitting determines the at least one secondary server to which the second content request is transmitted based on the content map (col.10, lines 10-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59).

34. As per claim 29, Major, Bommaiah and Burns and Shannon taught the invention substantially as claimed in claim 27. Shannon further taught that the means for generating and transmitting determines whether the content map indicates at least one secondary server known to store at least a type of content that corresponds to the streaming content corresponding to the first content request, the means for generating and transmitting generating a search of a plurality of secondary servers if the content map does not indicate at least one secondary server known to store at least a type of content that corresponds to the streaming content corresponding to the first content request, the means for generating and transmitting updating the content map based on

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results of the search (col.10, lines 10-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59).

35. Claims 6-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Major, Bommaiah and Burns and Doyle as applied to claim 4 above, and further in view of Shannon, US 6,233,618.

36. As per claims 6-7, Major, Bommaiah, Burns and Doyle taught the invention substantially as claimed in claims 1-5. Major, Bommaiah, Burns and Doyle did not specifically teach the method to comprise:

- a. Determining whether at least one secondary server is known to store at least a type of content that corresponds to the streaming content corresponding to the first content request based on a stored content map;
- b. Searching, if at least one secondary server is not known, a plurality of secondary servers to identify at least one secondary server that contains at least a type of content that corresponds to the streaming content corresponding to the first content request;
- c. Adding, in response to the searching step, to the stored content map the at least one identified secondary server located by the search; and
- d. Transmitting, based on the at least one secondary server identified in the content map, the second content request to that at least one secondary server in response to either the adding step or the at least one secondary server determining step.

37. Shannon taught a method to restrict user access using categories to determine whether at least one secondary server is known to store at least a type of content that corresponds to the streaming content corresponding to the first content request based on a stored content map (col.9, lines 18-24, 64-67, col.10, lines 1-28); searching a plurality of secondary servers to identify at least one secondary server that contains at least a type of content that corresponds to the streaming content corresponding to the first content request if at least one secondary server is not known (col.10, lines 10-28); in response to the searching step, adding to the stored content map the at least one identified secondary server located by the search (col.10, lines 21-28) and transmitting, based on the at least one secondary server identified in the content map, the second content request to that at least one secondary server in response to either the adding step or the at least one secondary server determining step (col.10, lines 24-28, col.12, lines 37-45, col.13, lines 19-30, 52-67, col.14, lines 1-5, 16-25, 49-59). It would have been obvious to one of ordinary skill in the art at the time the invention was made to combine the teachings of Major, Bommaiah, Burns, Doyle and Shannon because Shannon's teaching of accessing control and database matching enables Major, Bommaiah, Burns and Doyle's method to match the content categories in the request and determine whether the user is permitted to access the particular server to obtain the requested content.

#### ***Response to Arguments***

38. Applicant's arguments filed 6/20/2007 have been fully considered but they are not persuasive.

39. In the remark, applicant argued (1) the combination of Major, Burns and Bommaiah do not teach or suggest re-streaming the first portion of the cached content to the requesting client machine as a second portion is received.

40. Examiner traverse the argument:

As to point (1) Bommaiah specifically teach to request content, cache at least a portion of the requested content and download the portion of the requested content to the requesting client while concurrently retrieving a remaining portion of the requested content from the server (see claim 16). Since the specification of this application does not clearly define “re-streaming” distinctively from “downloading”, hence, Bommaiah’s teaching of downloading portions of the requested content while the remaining portion is being received at the helper server (i.e. proxy) reads clearly on the limitation of “re-streaming the first portion of the cached streaming content to the requesting client machine as at least a second portion of the received streaming content is cached”.

### *Conclusion*

41. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

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42. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the mailing date of this final action.

43. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kenny Lin whose telephone number is (571) 272-3968. The examiner can normally be reached on 8 AM to 5 PM Tue.-Fri. and every other Monday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Bunjob Jaroenchonwanit can be reached on (571) 272-3913. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

ksl  
July 30, 2007

